

MANUFACTURING EXTENSION PARTNERSHIP

Success Stories from the Field

Tire-tech Environmental Systems

Iowa Center for Industrial Research and Service

Tire-tech Environmental Systems Increases Sales with Help from CIRAS

Client Profile:

Tire-tech Environmental Systems is a tire recycling center that primarily processes over the road truck tires. The company employs 36 people at its facility in Muscatine, Iowa.

Situation:

Tire-tech Environmental was exploring additional markets for its recycled shredded tire products. While the company had already gained ground in the septic field aggregate and landscape mulch arena, it was interested in moving into markets where it could add more value and reap higher margins. Tire-tech Environmental contacted the Iowa Center for Industrial Research and Service (CIRAS), a NIST MEP network affiliate, for help.

Solution:

CIRAS' initial visit to Tire-tech Environmental showed that the company had a good concept of tasks it wanted to do but lacked some of the key resources to get them done quickly. The first problem was sorting pieces of the shredded tire material that still contained metal fragments to a level acceptable to mulch and playground surface material vendors. CIRAS developed a project with its partner, the Institute for Physical Research and Technology (IPRT), a network of scientific research centers at Iowa State University, which included a nondestructive evaluation, or NDE, where the product was examined and resources from the NDE field were brought to bear to improve the company's existing metal separation process. The evaluation involved inspecting or measuring without harming the future usefulness of the product. In combination with a magnetic expert, NDE helped optimize a key piece of machinery in order to almost completely eliminate the presence of exposed metals in the shredded tire product.

Results:

* Increased sales by \$37,120.

Testimonial:

"Without the help we received from CIRAS and IPRT NDE, we would still be working to solve our problems; sales would not be there, and we would be looking at a less-than-desirable future in the mulch business."

Dennis Froehlich, Operations Manager